

FPE 18

Expansion device shall be fabricated in one section, except for stage construction and when the length is over 50 feet. A complete joint penetration groove weld splice shall be required. Welds shall be ground flush to provide a smooth surface. The expansion device shall be fabricated and installed to the crown and grade of the roadway.

Material for the expansion device shall be ASTM A709 Grade 36 structural steel. Anchors for the expansion device shall be in accordance with Sec 1037.

Structural steel for the expansion device and curb plate shall be coated with a minimum of two coats of inorganic zinc primer (5 mils minimum) or galvanized in accordance with ASTM A123. Anchors need not be protected from overspray.

Payment for furnishing, coating or galvanizing and installing the structural steel for the expansion device will be considered completely covered by the contract unit price for Expansion Device (Flat Plate) per linear foot.

Concrete shall be forced under and around flat plate, anchors and angles. Proper consolidation shall be achieved by localized internal vibration. Finishing of the concrete shall be achieved by hand finishing within one foot of the expansion device. The vertical and horizontal concrete vent holes shall be offset from each other. Do not alternate holes at the 12" spacing.

Longitudinal reinforcing steel shall be placed so that ends shall not be more than $\pm 1"$ from vertical plate and the vertical leg of the angle at the expansion device.

Complete joint penetration welds utilized in the fabrication of the expansion device shall be nondestructively tested by an approved method.

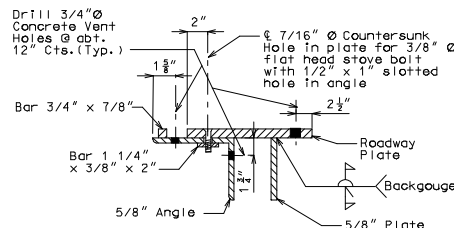
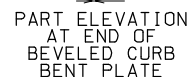


Diagram illustrating a beveled curb bent on a roadway face. The curb is shown in cross-section, with a beveled top edge. The vertical face of the curb is labeled 'C'. The horizontal face of the curb is labeled 'C'. The curb is bent at a 90-degree angle. The diagram shows the curb bent on a roadway face.

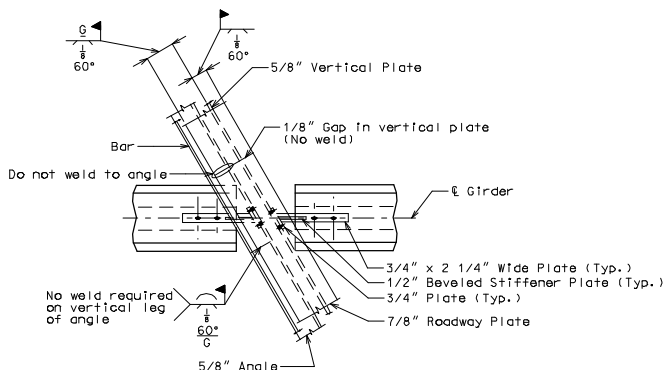
SECTION C-C

Note: Concrete vent holes not shown for clarity.

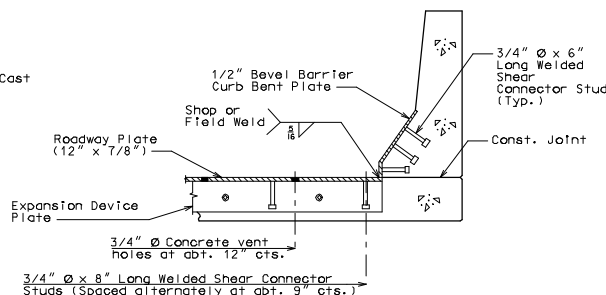


PART ELEVATION
AT END OF
BEVELED CURB
BENT PLATE

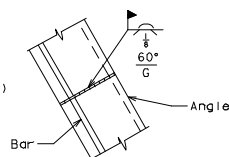
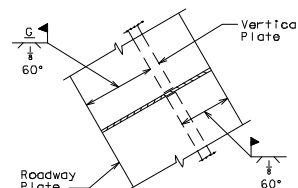
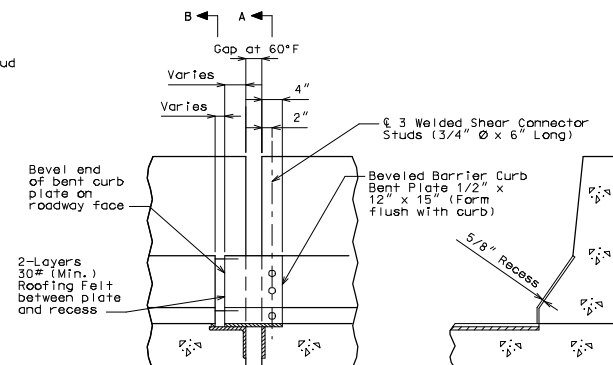
PART SECTION AT INTERMEDIATE BENT



PERMISSIBLE FIELD SPLICE AT INT. BENT



PART SECTION A-A

PART PLAN OF
ANGLE AND BARPART PLAN ROADWAY PLATE
AND VERTICAL PLATE

PART SECTION B-B

ELEVATION OF BARRIER CURB

DETAILS OF FLAT PLATE EXPANSION DEVICE AT INT. BENT NO.